
**MITIGATION MONITORING AND REPORTING PROGRAM
FOR LONG BEACH AIRPORT TERMINAL AREA IMPROVEMENT PROJECT**

This Mitigation Monitoring and Reporting Program (MMRP) has been prepared in accordance with Public Resources Code Section 21081.6, which requires a Lead or Responsible Agency that approves or carries out a project where an EIR has identified significant environmental effects to "adopt a reporting and monitoring program for the changes made to the project or conditions of project approval, adopted in order to mitigate or avoid significant effects on the environment." The City of Long Beach is the Lead Agency for the proposed project.

This MMRP is designed to monitor implementation of all feasible mitigation measures (MM) as identified in the Draft Environmental Impact Report (EIR) for the Long Beach Terminal Area Improvement Project. Each mitigation measure is listed and categorized by topic, with an accompanying discussion of the following:

- The **Monitoring Phase**, or the phase of the project during which the mitigation measure should be monitored (i.e., pre-construction, construction, or post-construction);
- The **Enforcement Agency** (i.e., the agency with the authority to enforce the mitigation measure); and
- The **Monitoring Agency** (i.e., the agency to which mitigation reports involving feasibility, compliance, implementation, and development operation are made).

The entity responsible for the implementation of all mitigation measures shall be the City of Long Beach, Planning and Building Department unless otherwise noted.

To more easily facilitate implementation of the MMP, the mitigation measures are roughly organized in stages associated with construction. Several of the mitigation measures would apply to more than one stage of construction. To facilitate the monitoring at each phase, these measures have been duplicated in each of the applicable stages. The categories and descriptions are as follows:

- **Pre-Construction** – This stage includes all aspects of design, including design of buildings (both interior and exterior) and design of construction practices (e.g., haul routes, Safety Plans, permits).
- **Demolition** – This includes measures which must be addressed immediately before or during demolition activities.
- **Grading** – This includes measures which must be addressed immediately before or during grading activities.
- **Construction** – This includes measures which must be addressed immediately before or during construction activities.
- **Post-Construction** – This stage describes measures which can only be addressed once construction has terminated and the building is in use.
- **On-Going** – This includes ongoing activities.
- **Optimized Flights Scenario** – This includes measures not associated with the proposed project.

The Mitigation Program Identified to reduce potential project impacts consists of: Project Design Features (PDF); Standard Conditions and Requirements (SC); and Mitigation Measures (MM). The numbering of these items in the MMRP is generally consistent with the numbering provided in the EIR, with the following exceptions:

Old Number	New Number
SC 3.4-4	MM 3.4-5
SC 3.4-5	MM 3.4-6
SC 3.4-6	SC 3.4-4
SC 3.4-7	SC 3.4-5
SC 3.4-8	MM 3.4-7
SC 3.4-9	MM3.4-8
SC 3.7-3	MM 3.7-1
SC 3.7-4	MM 3.7-2

It should also be noted that several new mitigation measures were added in response to comments received on the Draft EIR. Specifically, the following mitigation measures, which are included herein, were added: MM 3.2-10a, MM 3.2-10b, MM 3.2-16, and MM 3.2-17.

The components of the mitigation program are described below.

- **Project Design Features** – PDFs are specific design elements proposed by the project applicant and incorporated into the project to prevent the occurrence of, or reduce the significance of, potential environmental effects. Because PDFs have been incorporated into the project, they do not constitute mitigation measures as defined by California Environmental Quality Act (CEQA). However, PDFs are identified in the mitigation section for each topical issue to ensure that they are included in the mitigation monitoring program (MMP) to be developed for, and implemented as a part of, the proposed project.
- **Standard Conditions and Requirements** – Standard conditions and requirements are based on local, state, or federal regulations or laws that are frequently required independently of CEQA review. They also serve to offset or prevent specific impacts. Typical standard conditions and requirements include compliance with the provisions of the Uniform Building Code, South Coast Air Quality Management District Rules, local agency fee programs, etc. Additional conditions may be imposed on the project by government agencies during the approval process, as appropriate.
- **Mitigation Measures** – Where a potentially significant environmental effect has been identified and is not reduced to a level considered less than significant through the application of PDFs and standard conditions and requirements, project-specific mitigation measures have been recommended.

LIST OF ACRONYMS

The following are acronyms used in the Mitigation Monitoring and Reporting Program:

ACMs	Asbestos Containing Materials
ACP	Asbestos Concrete Pipe
ADPM	Average Day-Peak Month
APU	Auxiliary Power Unit
BACT	Best Available Control Technology
CCR	California Code of Regulations
CEQA	California Environmental Quality Act
CNEL	Community Noise Equivalent Level
CO	Carbon Monoxide
DDT	dichloro-diphenyl-trichloroethane
EIR	Environmental Impact Report
FAA	Federal Aviation Administration
GSE	Ground Support Equipment
HSCP	Health and Safety Contingency Plan
Hz	Hertz
LEED	Leadership in Energy and Environmental Design
LOS	Level of Service
MLD	Most Likely Descendent
MM	Mitigation Measure
MMP	Mitigation Monitoring Program
MMRP	Mitigation Monitoring and Reporting Program
MOU	Memorandum of Understanding
NO _x	Oxides of Nitrogen
PDF	Project Design Feature
PM ₁₀	Respirable particulate matter less than 10 micrometers in diameter
SCAQMD	South Coast Air Quality Management District
SC	Standard Conditions and Requirements
SWPPP	Stormwater Pollution Prevention Program
SWRCB	State Water Resources Control Board
TSA	Transportation Security Administration
USEPA	United States Environmental Protection Agency
V/C	Volume to Capacity (Ratio)
VOC	Volatile Organic Compound

Aesthetics

Project Design Features

PDF 3.1-1 The Guiding Principles have been used in the development of the conceptual design plan. As part of final design, the requirements outlined in these documents, which are named below, would provide guidance to protect the historic integrity of the existing terminal. This also serves to ensure a unified appearance and enhance the aesthetics of the terminal area. The Guiding Principles include: (1) May 7, 1990, memorandum of understanding (MOU) by the Neighborhood and Historic Preservation Officer for the City of Long Beach providing guidelines for future environmental review of the Airport Terminal Building; (2) Secretary of the Interior's standards for rehabilitation of historic buildings; (3) Development and Use Standards for the Long Beach Airport Terminal Planned Development Plan Ordinance adopted by the City Council on September 2, 1997; (4) the City's Cultural Heritage Ordinance (Chapter 2.63 of the Municipal Code); and (5) a memorandum on considerations for new construction prepared by PCR (June 22, 2005). These documents all provide guidance on development standards for terminal area improvements and are included in Appendix B of the EIR.

- **Monitoring Phase:** Pre-construction
- **Enforcement Agency:** City of Long Beach Planning and Building Department
- **Monitoring Agency:** City of Long Beach Planning and Building Department
- **Action Indicating Compliance:** Site Plan review/issuance of building permits.

Standard Conditions and Requirements

SC 3.1-1 Prior to building plan approval, the Planning Commission shall ensure that all development complies with the development standards and design guidelines contained in Ordinance No. C-7496, *Development and Use Standards for the Long Beach Airport Terminal Planned Development Plan (PD-12)*.

- **Monitoring Phase:** Pre-construction
- **Enforcement Agency:** City of Long Beach Planning and Building Department
- **Monitoring Agency:** City of Long Beach Planning Commission
- **Action Indicating Compliance:** Site Plan review/issuance of building permits.

SC 3.1-2 Prior to building plan approval, the Cultural Heritage Commission shall ensure that any new construction proposed adjacent to the Terminal Building or attached onto it shall comply with the Secretary of the Interior's Standards for the Treatment of Historic Properties with Guidelines for Preserving, Rehabilitating,

Restoring, and Reconstructing Historic buildings, and more specifically, the Secretary of the Interior's Standards for Rehabilitation (Standards).

- **Monitoring Phase:** Pre-construction
- **Enforcement Agency:** City of Long Beach, Planning and Building Department
- **Monitoring Agency:** City of Long Beach, Cultural Heritage Commission
- **Action Indicating Compliance:** Issuance of Certificate of Appropriateness.

SC 3.1-3 Prior to building plan approval, the Cultural Heritage Commission shall ensure that all development shall comply with the May 7, 1990 MOU adopted by the City Council and Cultural Heritage Commission providing guidelines for future environmental review of the Airport Terminal Building (the MOU is contained in Appendix B of the EIR).

- **Monitoring Phase:** Pre-construction
- **Enforcement Agency:** City of Long Beach, Planning and Building Department
- **Monitoring Agency:** City of Long Beach, Cultural Heritage Commission
- **Action Indicating Compliance:** Issuance of Certificate of Appropriateness.

Mitigation Measures

MM 3.1-3 Prior to building plan approval, the Planning Commission shall ensure that all exterior lighting be designed and located as to avoid intrusive effects on the runway operations, so as not to result in an air safety hazard. Low-intensity street lighting and low-intensity exterior lighting shall be used throughout the development to the extent feasible. Lighting fixtures shall use shielding, if necessary to prevent spill lighting on adjacent off-site uses.

- **Monitoring Phase:** Pre-construction
- **Enforcement Agency:** City of Long Beach Planning and Building Department
- **Monitoring Agency:** City of Long Beach Planning Commission
- **Action Indicating Compliance:** Site Plan review/issuance of building permits

MM 3.1-4 Prior to building plan approval, the Planning Commission shall ensure that all development projects use reflective glass that is less than 20 percent and all other materials used on exterior buildings and structures shall be selected with attention to minimizing reflective glare.

- **Monitoring Phase:** Pre-construction
- **Enforcement Agency:** City of Long Beach Planning and Building Department

- **Monitoring Agency:** City of Long Beach Planning Commission
- **Action Indicating Compliance:** Site Plan review/issuance of building permits.

Air Quality and Human Health Risk Assessment

Project Design Features

PDF 3.2-1 As part of project design, the City of Long Beach shall ensure the terminal area improvements are designed and constructed to meet Leadership in Energy and Environmental Design (LEED) specifications.

- **Monitoring Phase:** Pre-construction
- **Enforcement Agency:** City of Long Beach Planning and Building Department
- **Monitoring Agency:** City of Long Beach Planning and Building Department
- **Action Indicating Compliance:** Site Plan review/issuance of building permits.

Standard Conditions and Requirements

SC 3.2-3 In support of PDF 3.2-1, requiring the design and construction of the terminal improvements to meet LEED standards, all new and substantially modified buildings shall meet California Title 24 Energy Efficiency standards for water heating, space heating, and cooling to the extent feasible.

- **Monitoring Phase:** Pre-construction
- **Enforcement Agency:** City of Long Beach Planning and Building Department
- **Monitoring Agency:** City of Long Beach Planning and Building Department
- **Action Indicating Compliance:** Site Plan review/issuance of building permits.

SC 3.2-4 All new and modified point source facilities (e.g., utility equipment, fuel storage and dispensing) shall obtain all required permits from the South Coast Air Quality Management District (SCAQMD). To obtain these permits, the facilities will need to include Best Available Control Technology (BACT) that reduces emissions of criteria pollutants.

- **Monitoring Phase:** Pre-construction
- **Enforcement Agency:** South Coast Air Quality Management District
- **Monitoring Agency:** City of Long Beach Planning and Building Department
- **Action Indicating Compliance:** proof of BACT use/Site Plan review/issuance of permits.

SC 3.2-5 In support of PDF 3.2-1 and to conserve energy, require that all exterior lighting use color-corrected low sodium lighting.

- **Monitoring Phase:** Pre-construction
- **Enforcement Agency:** City of Long Beach Planning and Building Department
- **Monitoring Agency:** City of Long Beach Planning and Building Department
- **Action Indicating Compliance:** Site Plan review. Issuance of building permits.

Mitigation Measures

MM 3.2-11 During project design, the architect shall provide that all fixtures used for lighting exterior common areas are regulated by automatic devices to turn off lights when they are not needed.

- **Monitoring Phase:** Pre-construction
- **Enforcement Agency:** City of Long Beach Planning and Building Department
- **Monitoring Agency:** City of Long Beach Planning and Building Department
- **Action Indicating Compliance:** Site Plan review. Issuance of building permits.

MM 3.2-12 As part of the air carrier ramp design, the City of Long Beach shall incorporate electric charging station infrastructure to support operation of electric Ground Support Equipment (GSE) and other on-airport vehicles.

- **Monitoring Phase:** Pre-construction
- **Enforcement Agency:** City of Long Beach Public Works Department
- **Monitoring Agency:** City of Long Beach Planning and Building Department
- **Action Indicating Compliance:** Site Plan review. Issuance of building permits.

MM 3.2-13 As part of the air carrier ramp design, preconditioned air and 400 Hertz (Hz) power from electric units (or electric power grid) will incorporate provisions at the commercial passenger aircraft parking positions to allow aircraft pilots the ability to plug in at the gate and turn off the auxiliary power unit (APU).

- **Monitoring Phase:** Pre-construction
- **Enforcement Agency:** City of Long Beach Public Works Department
- **Monitoring Agency:** City of Long Beach Planning and Building Department

- **Action Indicating Compliance:** Site Plan review. Issuance of building permits.

Cultural Resources

Project Design Features

PDF 3.3-1 The Guiding Principles have been used in the development of the conceptual design plan. As part of final design, the requirements outlined in these documents, which are named below, would provide guidance to protect the historic integrity of the existing terminal. The Guiding Principles include: (1) May 7, 1990, MOU by the Neighborhood and Historic Preservation Officer for the City of Long Beach providing guidelines for future environmental review of the Airport Terminal Building; (2) Secretary of the Interior's standards for rehabilitation of historic buildings; (3) Development and Use Standards for the Long Beach Airport Terminal Planned Development Plan Ordinance adopted by the City Council on September 2, 1997; (4) the City's Cultural Heritage Ordinance (Chapter 2.63 of the Municipal Code); and (5) a memorandum on considerations for new construction prepared by PCR (June 22, 2005). These documents all provide guidance on development standards for terminal area improvements and are included in Appendix B of the EIR.

- **Monitoring Phase:** Pre-construction
- **Enforcement Agency:** City of Long Beach Planning and Building Department
- **Monitoring Agency:** City of Long Beach Cultural Heritage Commission
- **Action Indicating Compliance:** Site Plan review/Issuance of a certificate of appropriateness by the Cultural Heritage Commission.

Standard Conditions and Requirements

SC 3.3-3 In compliance with Chapter 2.63 of the Municipal Code no permits for the alteration, remodel, enlarging, or improvements to the Airport Terminal, shall be issued prior to review by the Cultural Heritage Commission and issuance by the Commission of a certificate of appropriateness.

- **Monitoring Phase:** Pre-construction
- **Enforcement Agency:** City of Long Beach, Cultural Heritage Commission
- **Monitoring Agency:** City of Long Beach, Planning and Building Department
- **Action Indicating Compliance:** Site plan approval. Issuance of certificate of appropriateness. Issuance of permits.

Mitigation Measures

It was determined that, prior to mitigation, the proposed terminal area improvements conceptual design has the potential to cause a substantial adverse change, as per Section 15064.5(b) of the CEQA Guidelines, in the significance of the Long Beach Airport Terminal Building because physical characteristics that convey the historical significance of the resource would be

materially altered in a manner that may not meet the Secretary's Standards. Those specific design concepts that have been identified as potentially adverse have corresponding mitigation measures as explained in the list below. If during the final design phase these specific design plans are not selected, then the associated mitigation measures would not be necessary. The applicability of these measures would be determined through design review by the Cultural Heritage Commission and issuance by the Commission of a certificate of appropriateness, as outlined in Chapter 2.63 of the Municipal Code (SC 3.3-3). Additionally, other design measures may be recommended by the Cultural Heritage Commission through the design review process, which would be required prior to issuance of a certificate of appropriateness.

MM 3.3-1 If the proposed Airport Terminal improvements are to be connected to the original 1941 structure, then the project architect shall design the connection between the new structure and the existing Airport Terminal Building so that it is attached beneath the existing cornice, to be consistent with the Streamline Moderne design.

- **Monitoring Phase:** Pre-construction
- **Enforcement Agency:** City of Long Beach Planning and Building Department
- **Monitoring Agency:** City of Long Beach Planning and Building Department
- **Action Indicating Compliance:** Site Plan review. Issuance of a certificate of appropriateness by the Cultural Heritage Commission.

MM 3.3-2 If during final design, new windows are required in the existing Airport Terminal Building, the project architect shall ensure that window treatments reference the style of the original Airport Terminal windows, which are very specific to the Airport Terminal. The use of the window wall, as seen on the northwest and southwest corner, shall be used as an example.

- **Monitoring Phase:** Pre-construction
- **Enforcement Agency:** City of Long Beach Planning and Building Department
- **Monitoring Agency:** City of Long Beach Planning and Building Department
- **Action Indicating Compliance:** Site Plan review/issuance of a certificate of appropriateness by the Cultural Heritage Commission

MM 3.3-3 If during the final design, window replacement is proposed for the original Airport Terminal Building, then the new window(s) shall replicate the original style of fenestration. If the original windows that are currently missing from the building are still extant, then those windows shall be returned to their original location, if feasible.

- **Monitoring Phase:** Pre-construction
- **Enforcement Agency:** City of Long Beach Planning and Building Department

- **Monitoring Agency:** City of Long Beach Planning and Building Department
- **Action Indicating Compliance:** Site Plan review. Issuance of a certificate of appropriateness by the Cultural Heritage Commission.

MM 3.3-4 If during final design, new doorframes in the Airport Terminal Building are proposed, then the project architect shall reference the style of the original doorframes located on the east and south facades of the original Airport Terminal Building for the new doorway(s).

- **Monitoring Phase:** Pre-construction
- **Enforcement Agency:** City of Long Beach Planning and Building Department
- **Monitoring Agency:** City of Long Beach Cultural Heritage Commission
- **Action Indicating Compliance:** Site Plan review. Issuance of a certificate of appropriateness by the Cultural Heritage Commission.

MM 3.3-5 The City of Long Beach, Public Works Director or designee shall stipulate in the Plans and specifications that exterior material should be compatible in type, color and finish to the existing material used on the Airport Terminal Building. Testing should be done to determine original colors, if necessary. Implementation of this mitigation measure will be at the direction of the Cultural Heritage Commission.

- **Monitoring Phase:** Pre-construction
- **Enforcement Agency:** City of Long Beach Public Works Department
- **Monitoring Agency:** City of Long Beach Planning and Building Department
- **Action Indicating Compliance:** Site Plan review. Issuance of a certificate of appropriateness by the Cultural Heritage Commission.

MM 3.3-6 If during final design, the shelter/ticketing areas are proposed on either side of the existing 1941 Airport Terminal Building, then the project architect shall scale down the proposed design. This could be accomplished with a lower profile, possibly with a flat roof that fits in visually with the horizontal nature of the architectural style of the terminal. The manner in which this mitigation measure will be implemented shall be reviewed by the Cultural Heritage Commission as part of the issuance of the certificate of appropriateness.

- **Monitoring Phase:** Pre-construction
- **Enforcement Agency:** City of Long Beach Planning and Building Department
- **Monitoring Agency:** City of Long Beach Planning and Building Department
- **Action Indicating Compliance:** Site Plan review. Issuance of a certificate of appropriateness by the Cultural Heritage Commission.

Hazards and Hazardous Wastes

Standard Conditions and Requirements

SC 3.4-2 The Contractor shall develop a Storm Water Pollution Prevention Plan (SWPPP) to minimize potential short-term significant hazardous materials impacts associated with construction activities.

- **Monitoring Phase:** Pre-construction
- **Enforcement Agency:** City of Long Beach Public Works Department
- **Monitoring Agency:** State Water Resources Control Board (SWRCB)
- **Action Indicating Compliance:** A completed SWPPP submitted to SWRCB.

SC 3.4-4 The Airport shall comply with the Airport Industrial National Pollutant Discharge Elimination System permit (CAS000001/WDID 4B19S004985). Construction activities that disturb more than one acre shall abide by the State issued State Water Resources Control Board Order 99-08 General Permit CAS000002. As part of this process, the Airport would be required to prepare a Storm Water Pollution Prevention Plan.

- **Monitoring Phase:** Pre-construction
- **Enforcement Agency:** City of Long Beach Public Works Department
- **Monitoring Agency:** State Water Resources Control Board
- **Action Indicating Compliance:** A completed SWPPP submitted to SWRCB/issuance of permit.

SC 3.4-5 Construction of the Proposed Project shall be in compliance with local and State construction and building requirements and regulations, including the Uniform Building Code.

- **Monitoring Phase:** Pre-Construction/Construction
- **Enforcement Agency:** City of Long Beach, Planning and Building Department
- **Monitoring Agency:** City of Long Beach, Planning and Building Department
- **Action Indicating Compliance:** Approval of Development Plans. Site inspections.

Mitigation Measures

MM 3.4-1 Prior to the initiation of demolition/construction, the Contractor shall develop an approved Health and Safety Contingency Plan (HSCP) in the event that unanticipated/unknown environmental contaminants are encountered during construction. The plan shall be developed to protect workers, safeguard the environment, and meet the requirements of the California Code of Regulations (CCR), Title 8, General Industry Safety Orders – Control of Hazardous

Substances. The Plan shall include measures for handling any unknown wastes or suspect materials discovered during construction by the Contractor, which he/she believes may involve hazardous waste or hazardous materials.

- **Monitoring Phase:** Pre-construction
- **Enforcement Agency:** City of Long Beach Planning and Building Department
- **Monitoring Agency:** City of Long Beach Planning and Building Department
- **Action Indicating Compliance:** A completed HSCP. Issuance of Notice to Proceed for construction.

Public Services

Project Design Features

PDF 3.7-1 The Proposed Project and the build scenarios include a number of features that would enhance public safety and security at the Airport. These features, which include new holdrooms, concession areas, passenger and baggage security screening facilities, baggage claim devices, baggage service office, restrooms, office space, and ticketing facilities, would reduce overcrowding and provide an expanded baggage screening area, which would also be enclosed to protect sensitive screening equipment.

- **Monitoring Phase:** Pre-construction
- **Enforcement Agency:** City of Long Beach, Planning and Building Department
- **Monitoring Agency:** City of Long Beach, Planning and Building Department
- **Action Indicating Compliance:** Site Plan review. Issuance of permit.

Standard Conditions and Requirements

SC 3.7-1 Prior to the initiation of construction activities, the City's contractor shall prepare a Traffic Control Plan to ensure that adequate emergency access is maintained at the Airport during construction. As part of the Traffic Control Plan the contractor shall alert emergency and security service providers of the construction activities for each phase of construction. The Traffic Control Plan shall be submitted to the City Traffic Engineer for approval.

- **Monitoring Phase:** Pre-construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Acceptance of an approved Traffic Control Plan.

SC 3.7-2 During project design, the facility improvements shall adhere to Transportation Security Administration (TSA), Federal Aviation Administration (FAA), and all applicable standards including City of Long Beach fire code, building code, and safety code. Long Beach Fire Department shall review and approve design plans as part of the site plan review and building permit processes.

- **Monitoring Phase:** Pre-construction
- **Enforcement Agency:** City of Long Beach, Planning and Building Department.
- **Monitoring Agency:** City of Long Beach, Airport Bureau and City of Long Beach Fire Department
- **Action Indicating Compliance:** Site Plan review. Issuance of permit.

MM 3.7-2 Prior to initiation of any modifications to the airfield side, the contractor shall provide a Construction Phasing Implementation Plan, meeting the approval of the Airport Manager. The Plan shall demonstrate how construction activities will be conducted and that all applicable FAA airfield safety requirements are being met. In addition, the contractor shall prepare a safety plan and participate in on-going weekly safety meetings during construction.

- **Monitoring Phase:** Pre-construction/Construction
- **Enforcement Agency:** City of Long Beach, Airport Bureau
- **Monitoring Agency:** City of Long Beach, Airport Bureau
- **Action Indicating Compliance:** Acceptance of an approved Construction Phasing Implementation Plan and an approved Safety Plan.

Traffic and Circulation

Project Design Features

PDF 3.8-1 A component of the Proposed Project is the provision of a new parking structure that would accommodate 4,000 vehicles.

- **Monitoring Phase:** Pre-construction/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Planning and Building Department
- **Action Indicating Compliance:** Design and construction of a parking structure.

PDF 3.8-2 The project would also include the extension of the south side of the Donald Douglas Drive loop to exit onto Lakewood Boulevard, with eastbound right turn only to southbound access on to Lakewood Boulevard.

- **Monitoring Phase:** Pre-construction/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department

- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Design and extension of Douglas Drive loop; eastbound right turn to southbound access onto Lakewood Boulevard.

PDF 3.8-3 With the construction of the parking structure existing surface parking would be displaced. To address potential parking demand during construction, Parcel O would be developed to serve parking demand not met by existing facilities.

- **Monitoring Phase:** Pre-construction/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Development of Parcel O to accommodate displaced vehicle parking during construction of the parking structure and Terminal improvements. Compliance can also be accomplished by leasing existing unused parking spaces from Boeing (requires a signed lease agreement).

DEMOLITION STAGE

Aesthetics

Mitigation Measures

MM 3.1-1 During construction activities, the construction contractor shall ensure that construction materials and equipment staging areas be located away from existing residential uses and, when feasible, appropriate screening (i.e., temporary fencing with opaque material) shall be used to buffer views of the construction site.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Placement of staging area to be approved prior to building commencement. Inclusion of requirement in contract specifications.

MM 3.1-2 During construction activities, the construction contractor shall ensure that temporary construction-related security lighting shall be arranged so that direct rays will not shine on or produce glare for adjacent street traffic and residential uses. The light fixtures specified for the Project design must comply with the standard of the Illuminating Engineering Society for full cutoff capability.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Inclusion of requirement in contract specifications. Approval of construction staging plans.

Air Quality and Human Health Risk Assessment

Standard Conditions and Requirements

SC 3.2-1 During construction of the Proposed Project, the City and its contractors will be required to comply with regional rules, which would assist in reducing short-term air pollutant emissions. SCAQMD Rule 402 requires that air pollutant emissions should not create a nuisance off-site. SCAQMD Rule 403 requires that fugitive dust be controlled with the best available control measures so the presence of such dust does not remain visible in the atmosphere beyond the property line of the emission source. Two options are presented in Rule 403; monitoring of particulate concentrations or active control. Monitoring involves a sampling network around the project with no additional control measures unless specified concentrations are exceeded. The active control option does not require any monitoring, but requires that a list of measures be implemented starting with the first day of construction.

Rule 403 requires that "A person conducting active operations within the boundaries of the South Coast Air Basin shall utilize one or more of the

applicable best available control measures to minimize fugitive dust emissions from each fugitive dust source type which is part of the active operation." Rule 403 also requires that the construction activities "shall not cause or allow PM₁₀ levels to exceed 50 micrograms per cubic meter when determined by simultaneous sampling, as the difference between upwind and down wind sample." A project is exempt from the monitoring requirement "if the dust control actions, as specified in Table 2 are implemented on a routine basis for each applicable fugitive dust source type." (Table 2 from Rule 403 is presented at the end of this MMRP as Table 1.) Under high wind conditions (i.e., when wind gusts exceed 25 miles per hour) additional control measures are required, and "the required control measures for high wind conditions are implemented for each applicable fugitive dust source type, as specified in Table 1." (Table 1 from Rule 403 is presented at the end of this MMRP as Table 2.) Monitoring of particulate concentrations does not reduce fugitive dust emissions; therefore, to minimize fugitive dust emissions the construction activities will utilize the measures presented in Table 2 and Table 1 (Tables 1 and 2 in Rule 403) rather than the monitoring option of SCAQMD Rule 403.

Further, Rule 403 requires that the project shall "prevent or remove within one hour the track-out of bulk material onto public paved roadways as a result of their operations." Alternatively, the project can "take at least one of the actions listed in Table 3." (Table 3 from Rule 403 is presented at the end of this MMRP as Table 3.) In addition, the project would be required to "prevent the track-out of bulk material onto public paved roadways as a result of their operations and remove such material at anytime track-out extends for a cumulative distance of greater than 50 feet on to any paved public road during active operations; and remove all visible roadway dust tracked-out upon public paved roadways as a result of active operations at the conclusion of each work day when active operations cease.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Inclusion of requirement in contract specifications. Site inspections.

SC 3.2-2

In support of PDF 3.2-1, requiring the design and construction of the terminal improvements to meet LEED standards, building materials, architectural coatings and cleaning solvents shall comply with all applicable SCAQMD rules and regulations.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Inclusion of requirements in contract specifications. Field Inspections.

Mitigation Measures

The follow mitigation measures are grouped because the enforcement agency, monitoring agency, and actions indicating compliance are the same for all.

- MM 3.2-1 The contract specifications shall require and the City shall enforce general contractors to ensure that all equipment is properly tuned and maintained in accordance with manufacturers' specifications.
- MM 3.2-2 The contract specifications shall require and the City shall enforce general contractors to maintain and operate construction equipment so as to minimize exhaust emissions. During construction, engines on trucks and vehicles in loading and unloading queues will be turned off when not in use, to reduce vehicle emissions. Construction activities should be phased and scheduled to avoid emissions peaks and discontinued during second-stage smog alerts.
- MM 3.2-3 The contract specifications shall require and the City shall enforce general contractors sweep streets as needed during construction, but not more frequently than hourly, if visible soil material has been carried onto adjacent public roads.
- MM 3.2-4 The contract specifications shall require and the City shall enforce general contractors to visually inspect construction equipment prior to leaving the site; loose dirt shall be washed off with wheel washers as necessary.
- MM 3.2-5 During construction, the City shall coordinate with the contractor to maximize the ability to power construction activity utilizing electricity from power poles rather than temporary diesel or gasoline power generators, to the extent possible.
- MM 3.2-6 The contract specifications shall require that all on-site mobile equipment used during construction shall be powered by alternative fuel sources (i.e., methanol, natural gas, propane, or butane) where feasible.
- MM 3.2-7 During construction, the City shall provide a location and require the contractor to store all construction equipment used in the project construction within the project site (away from adjacent residential areas) to reduce the impact on the roadway system and the resultant air emissions.
- On-site construction equipment staging areas and construction worker parking lots shall be located on either paved surfaces or unpaved surfaces that are periodically treated with non-toxic soil stabilizers.
- MM 3.2-8 The contract specifications shall require and the City shall enforce the contractor to schedule all deliveries related to construction activities that affect traffic flow during off-peak hours (e.g., 10:00 a.m. and 3:00 p.m.) and deliveries shall be coordinated to achieve consolidated truck trips. When traffic flow is impacted by the movement of construction materials and/or equipment, temporary traffic controls shall be provided to improve traffic flow (e.g., flag person).
- MM 3.2-9 The contract specifications shall require all on-site heavy-duty construction equipment shall be equipped with diesel particulate traps to the extent that this equipment is available at the time the contracts are awarded.
- MM 3.2-10 The construction specifications shall require and the City shall enforce that emulsified diesel fuel be used in diesel-fueled construction equipment that is not equipped with diesel particulate traps to reduce NO_x emissions.

The use of emulsified diesel fuel in construction equipment is assumed to reduce construction equipment NO_x emissions by 15 to 20 percent (CARB 2004). Applying the lower end of that range to the peak daily NO_x emissions from construction equipment would reduce NO_x emissions by approximately 70 lbs/day to a peak day NO_x emission inventory for construction of 424 lbs/day. This level would still be above the significance threshold. Volatile Organic Compound (VOC) emissions would also remain significant and unavoidable.

MM 3.2-10a During construction of the Proposed Project, the City and its contractors shall be required to comply with the following provisions, where feasible, to reduce construction NO_x and VOC emissions:

- Provide on-site lunch trucks/facilities during construction to reduce off-site worker vehicle trips.
- Prohibit construction vehicles idling in excess of five minutes to be consistent with State law.
- Suspend use of all construction equipment during a first-stage smog alert.
- Designate a person who will ensure implementation of the proposed mitigation measures through direct inspection and investigation of complaints. The City or the contractor shall provide a telephone number that residents may call should they have complaints regarding construction nuisance.

MM 3.2-17 The City will require street cleaning of Douglas Drive with a vacuum type street sweeper at least once per week. The vacuum sweeper will make sufficient circuits through the terminal area to vacuum the entire street surface (not just the gutter area) to reduce fugitive PM emissions from re-entrained road dust. Douglas Drive between Lakewood Boulevard and the Long Beach Airport terminal (including the loop in front of the terminal and return) shall be cleaned in this manner. The anticipated future exit road back to Lakewood Boulevard would also be cleaned in this manner.

The range of potential control efficiencies for this mitigation measure is from approximately 10 percent to 50 percent.^{1,2} It is anticipated that a 75 percent reduction would be needed to reduce the peak incremental PM₁₀ concentration below the significance threshold; therefore, PM₁₀ concentrations would remain significant after implementation of this mitigation measure.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Inclusion of requirements in contract specifications. Site inspections.

¹ Cowherd, C., P. Englehart, G.E. Muleski, J.S. Kinsey, and K.D. Rosbury, 1990. Control of Fugitive and Hazardous Dusts, Noyes Data Corporation, Park Ridge, NJ. p.21.

² "Improvement of Specific Emission Factors (BACM Project No. 1) Final Report," by Midwest Research Institute for SCAQMD, Diamond Bar, CA, March 29, 1996.

Hazards and Hazardous Wastes

Project Design Features

PDF 3.4-1 The proposed terminal improvements would be constructed in a manner consistent with LEED standards certification requirements to, among other things, minimize potential hazards and hazardous waste impacts.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach Public Works Department
- **Action Indicating Compliance:** Inclusion of requirement in contract specifications. Site inspections.

Standard Conditions and Requirements

SC 3.4-3 The Airport Terminal Building is known to contain asbestos concrete materials (ACMs). The applicant shall comply with notification and asbestos removal procedures outlined in SCAQMD Rule 1403 to reduce asbestos-related health issues.

- **Monitoring Phase:** Demolition
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Report summarizing the findings and submitted to the City and SCAQMD, which includes a description of mitigation measures which will be taken to remove the ACMs (if applicable). Notification measures as described in SCAQMD Rule 1403.

Mitigation Measures

MM 3.4-2 Prior to the demolition of any on-site building or portion of any on-site building constructed prior to 1973, the City shall screen the buildings for lead-based paint. If lead-based paint is identified, remediation measures shall be developed in accordance with all applicable federal, State, and local regulatory requirements.

- **Monitoring Phase:** Demolition
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Report summarizing the findings and identification of remediation measures, if necessary. Inclusion in contractor specifications, if applicable.

MM 3.4-3 During demolition and excavation activities and during preparation of the geotechnical study in the design phase, the City shall have a qualified inspector onsite to inspect and sample the soil for contaminants. If observations during demolition activities indicate that site soil is affected by contaminants, demolition work should be stopped in the area involved until an analysis of the soil

conditions can be performed and additional recommendations evaluated and performed as necessary.

- **Monitoring Phase:** Demolition
- **Enforcement Agency:** City of Long Beach Public Works Department
- **Monitoring Agency:** City of Long Beach Public Works Department
- **Action Indicating Compliance:** A completed geotechnical study. Issuance of permits.

MM 3.4-5

Prior to demolition of any facilities at Million Air, the applicant shall test for asbestos containing materials. Should ACM or asbestos concrete pipe (ACP) be found, the applicant shall comply with notification and asbestos removal procedures outlined in SCAQMD Rule 1403 to reduce asbestos related health risks.

- **Monitoring Phase:** Demolition
- **Enforcement Agency:** City of Long Beach, Planning and Building Department
- **Monitoring Agency:** City of Long Beach, Planning and Building Department
- **Action Indicating Compliance:** Report summarizing the findings and submitted to the City and SCAQMD, which includes a description of mitigation measures which will be taken to remove the ACM or ACP (if applicable). Notification measures as described in SCAQMD Rule 1403.

MM 3.4-6

The City Engineer, or his designee, shall verify that every contractor transporting or handling hazardous materials and/or wastes during project implementation has permits and licenses from all relative health and regulatory agencies to operate and properly manifest all hazardous or California regulated material.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach Public Works Department
- **Monitoring Agency:** City of Long Beach Public Works Department
- **Action Indicating Compliance:** Proof that appropriate permits and licenses have been obtained; display of manifests.

MM 3.4-7

Prior to initiating construction activities, the contractor shall verify the locations of underground pipelines in the terminal area, ramp, and parking areas. Appropriate precautions shall be taken to ensure that pipelines are not disturbed or are properly relocated during construction.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department

- **Action Indicating Compliance:** Inclusion of requirement in contract specifications. Site inspections.

Noise

Standard Conditions and Requirements

- SC 3.6-2 The contractor shall comply with the City of Long Beach Noise Ordinance pertaining to limitations on construction activities, as outlined in Exhibit 3.6-12 of the EIR, to the extent feasible while minimizing any potential conflicts with aviation activities.
- **Monitoring Phase:** Demolition/Grading/Construction
 - **Enforcement Agency:** City of Long Beach, Public Works Department
 - **Monitoring Agency:** City of Long Beach, Public Works Department
 - **Action Indicating Compliance:** Inclusion of requirement in contract specifications. Adherence to the construction hours and requirements specified in the City's Noise Ordinance or permission from City work outside of those hours.

Mitigation Measures

- MM 3.6-1 The City shall conduct noise measurements during any night construction on Parcel O where such construction involves the use of heavy construction equipment such as front loaders, tractors, graders, paving machines, jackhammers or similar devices. Such measurements shall be made near the homes located directly across Clark Avenue from Parcel O. If any night measurement exceeds the limits specified in Sections 8.80.150 and 8.80.160 of the Long Beach Municipal Code as a result of the construction activity, the operation shall be terminated until such time that a construction noise mitigation plan can be put into effect that will result in compliance with the night time noise limits. Note that in the case where ambient noise levels exceed the noise limits specified in Section 8.80.160, the allowable noise exposure standard shall be increased per Section 8.80.150 [C] of the Municipal Code to reflect ambient levels.
- **Monitoring Phase:** Demolition/Grading/Construction
 - **Enforcement Agency:** City of Long Beach, Public Works Department
 - **Monitoring Agency:** City of Long Beach, Public Works Department
 - **Action Indicating Compliance:** Reports summarizing the findings of the noise measurements, if heavy construction equipment as defined above is used on during night construction on Parcel O. Preparation of a construction noise mitigation plan (if applicable).

Traffic and Circulation

Standard Conditions and Requirements

- SC 3.8-1 As part of contract specification, the Airport shall require all construction trucks to access the Airport terminal area via the I-605 to I-405 and Lakewood Boulevard. Should oversized-transport vehicles accessing the Project site use a State

highway, a Caltrans transportation permit will be required. Construction vehicles accessing Parcel O shall use this route and access the construction site off of Clark Avenue or Willow Street.

Monitoring Phase: Demolition/Grading/Construction

- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Site inspections.

GRADING STAGE

Aesthetics

Mitigation Measures

MM 3.1-1 During construction activities, the construction contractor shall ensure that construction materials and equipment staging areas be located away from existing residential uses and, when feasible, appropriate screening (i.e., temporary fencing with opaque material) shall be used to buffer views of the construction site.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach, Planning and Building Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Placement of staging area to be approved prior to building commencement. Inclusion of requirement in contract specifications.

MM 3.1-2 During construction activities, the construction contractor shall ensure that temporary construction-related security lighting shall be arranged so that direct rays will not shine on or produce glare for adjacent street traffic and residential uses. The light fixtures specified for the Project design must comply with the standard of the Illuminating Engineering Society for full cutoff capability.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Inclusion of requirement in contract specifications. Approval of construction staging plans.

Air Quality and Human Health Risk Assessment

Standard Conditions and Requirements

SC 3.2-1 During construction of the Proposed Project, the City and its contractors will be required to comply with regional rules, which would assist in reducing short-term air pollutant emissions. SCAQMD Rule 402 requires that air pollutant emissions should not create a nuisance off-site. SCAQMD Rule 403 requires that fugitive dust be controlled with the best available control measures so the presence of such dust does not remain visible in the atmosphere beyond the property line of the emission source. Two options are presented in Rule 403; monitoring of particulate concentrations or active control. Monitoring involves a sampling network around the project with no additional control measures unless specified concentrations are exceeded. The active control option does not require any monitoring, but requires that a list of measures be implemented starting with the first day of construction.

Rule 403 requires that "A person conducting active operations within the boundaries of the South Coast Air Basin shall utilize one or more of the applicable best available control measures to minimize fugitive dust emissions from each fugitive dust source type which is part of the active operation." Rule 403 also requires that the construction activities "shall not cause or allow PM₁₀ levels to exceed 50 micrograms per cubic meter when determined by simultaneous sampling, as the difference between upwind and down wind sample." A project is exempt from the monitoring requirement "if the dust control actions, as specified in Table 2 are implemented on a routine basis for each applicable fugitive dust source type." (Table 2 from Rule 403 is presented at the end of this MMRP as Table 1.) Under high wind conditions (i.e., when wind gusts exceed 25 miles per hour) additional control measures are required, and "the required control measures for high wind conditions are implemented for each applicable fugitive dust source type, as specified in Table 1." (Table 1 from Rule 403 is presented at the end of this MMRP as Table 2. Monitoring of particulate concentrations does not reduce fugitive dust emissions; therefore, to minimize fugitive dust emissions the construction activities will utilize the measures presented in Table 2 and Table 1 (Tables 1 and 2 in Rule 403) rather than the monitoring option of SCAQMD Rule 403.

Further, Rule 403 requires that the project shall "prevent or remove within one hour the track-out of bulk material onto public paved roadways as a result of their operations." Alternatively, the project can "take at least one of the actions listed in Table 3." (Table 3 from Rule 403 is presented at the end of this MMRP as Table 3.) In addition, the project would be required to "prevent the track-out of bulk material onto public paved roadways as a result of their operations and remove such material at anytime track-out extends for a cumulative distance of greater than 50 feet on to any paved public road during active operations; and remove all visible roadway dust tracked-out upon public paved roadways as a result of active operations at the conclusion of each work day when active operations cease.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** South Coast Air Quality Management District
- **Action Indicating Compliance:** Inclusion of requirement in contract specifications. Site inspections.

SC 3.2-2

In support of PDF 3.2-1, requiring the design and construction of the terminal improvements to meet LEED standards, building materials, architectural coatings and cleaning solvents shall comply with all applicable SCAQMD rules and regulations.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Inclusion of requirement in contract specifications. Field inspections.

Mitigation Measures

The follow mitigation measures are grouped because the enforcement agency, monitoring agency, and actions indicating compliance are the same for all.

- MM 3.2-1 The contract specifications shall require and the City shall enforce general contractors to ensure that all equipment is properly tuned and maintained in accordance with manufacturers' specifications.
- MM 3.2-2 The contract specifications shall require and the City shall enforce general contractors to maintain and operate construction equipment so as to minimize exhaust emissions. During construction, engines on trucks and vehicles in loading and unloading queues will be turned off when not in use, to reduce vehicle emissions. Construction activities should be phased and scheduled to avoid emissions peaks and discontinued during second-stage smog alerts.
- MM 3.2-3 The contract specifications shall require and the City shall enforce general contractors sweep streets as needed during construction, but not more frequently than hourly, if visible soil material has been carried onto adjacent public roads.
- MM 3.2-4 The contract specifications shall require and the City shall enforce general contractors to visually inspect construction equipment prior to leaving the site; loose dirt shall be washed off with wheel washers as necessary.
- MM 3.2-5 During construction, the City shall coordinate with the contractor to maximize the ability to power construction activity utilizing electricity from power poles rather than temporary diesel or gasoline power generators, to the extent possible.
- MM 3.2-6 The contract specifications shall require that all on-site mobile equipment used during construction shall be powered by alternative fuel sources (i.e., methanol, natural gas, propane, or butane) where feasible.
- MM 3.2-7 During construction, the City shall provide a location and require the contractor to store all construction equipment used in the project construction within the project site (away from adjacent residential areas) to reduce the impact on the roadway system and the resultant air emissions.
- On-site construction equipment staging areas and construction worker parking lots shall be located on either paved surfaces or unpaved surfaces that are periodically treated with non-toxic soil stabilizers.
- MM 3.2-8 The contract specifications shall require and the City shall enforce the contractor to schedule all deliveries related to construction activities that affect traffic flow during off-peak hours (e.g., 10:00 a.m. and 3:00 p.m.) and deliveries shall be coordinated to achieve consolidated truck trips. When traffic flow is impacted by the movement of construction materials and/or equipment, temporary traffic controls shall be provided to improve traffic flow (e.g., flag person).
- MM 3.2-9 The contract specifications shall require all on-site heavy-duty construction equipment shall be equipped with diesel particulate traps to the extent that this equipment is available at the time the contracts are awarded.
- MM 3.2-10 The construction specifications shall require and the City shall enforce that emulsified diesel fuel be used in diesel-fueled construction equipment that is not equipped with diesel particulate traps to reduce NO_x emissions.

The use of emulsified diesel fuel in construction equipment is assumed to reduce construction equipment NO_x emissions by 15 to 20 percent (CARB 2004). Applying the lower end of that range to the peak daily NO_x emissions from construction equipment would reduce NO_x emissions by approximately 70 lbs/day to a peak day NO_x emission inventory for construction of 424 lbs/day. This level would still be above the significance threshold. VOC emissions would also remain significant and unavoidable.

MM 3.2-10a During construction of the Proposed Project, the City and its contractors shall be required to comply with the following provisions, where feasible, to reduce construction NO_x and VOC emissions:

- Provide on-site lunch trucks/facilities during construction to reduce off-site worker vehicle trips.
- Prohibit construction vehicles idling in excess of five minutes to be consistent with State law.
- Suspend use of all construction equipment during a first-stage smog alert.
- Designate a person who will ensure implementation of the proposed mitigation measures through direct inspection and investigation of complaints. The City or the contractor shall provide a telephone number that residents may call should they have complaints regarding construction nuisance.

MM 3.2-17 The City will require street cleaning of Douglas Drive with a vacuum type street sweeper at least once per week. The vacuum sweeper will make sufficient circuits through the terminal area to vacuum the entire street surface (not just the gutter area) to reduce fugitive PM emissions from re-entrained road dust. Douglas Drive between Lakewood Boulevard and the Long Beach Airport terminal (including the loop in front of the terminal and return) shall be cleaned in this manner. The anticipated future exit road back to Lakewood Boulevard would also be cleaned in this manner.

The range of potential control efficiencies for this mitigation measure is from approximately 10 percent to 50 percent.^{3,4} It is anticipated that a 75 percent reduction would be needed to reduce the peak incremental PM₁₀ concentration below the significance threshold; therefore, PM₁₀ concentrations would remain significant after implementation of this mitigation measure.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Inclusion of requirement in contract specifications. Site inspections.

³ Cowherd, C., P. Englehart, G.E. Muleski, J.S. Kinsey, and K.D. Rosbury, 1990. Control of Fugitive and Hazardous Dusts, Noyes Data Corporation, Park Ridge, NJ. p.21.

⁴ "Improvement of Specific Emission Factors (BACM Project No. 1) Final Report," by Midwest Research Institute for SCAQMD, Diamond Bar, CA, March 29, 1996.

Cultural Resources

Standard Conditions and Requirements

SC 3.3-1 Should any archaeological resources be uncovered during grading or excavation activities, these activities shall be diverted to a part of the site away from the find, and a qualified archaeologist shall be contracted by the contractor to: (1) ascertain the significance of the resource; (2) establish protocol with the project applicant to protect such resources; (3) ascertain the presence of additional resources; and (4) provide additional monitoring of the site, if deemed appropriate. If human remains are discovered on the site, the Los Angeles County Coroner shall be contacted to examine the remains, and the provisions of Section 15064.5(3) of the CEQA Guidelines shall be followed.

- **Monitoring Phase:** Grading
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** If remains are discovered, preparation of a written report by archaeologist and/or Los Angeles County Coroner.

SC 3.3-2 If human remains are encountered during ground-disturbing activities, State Health and Safety Code Section 7050.5 states that no further disturbance shall occur until the County Coroner has made a determination of origin and disposition of the materials pursuant to Public Resources Code Section 5097.98. The County Coroner must be notified of the find immediately. If the remains are determined to be prehistoric, the Coroner will notify the Native American Heritage Commission (). The will determine and notify a Most Likely Descendent (MLD). With the permission of the landowner or his/her authorized representative, the MLD may inspect the site of the discovery. The descendent must complete the inspection within 24 hours of notification by the . The MLD may recommend scientific removal and nondestructive analysis of human remains and items associated with Native American burials.

- **Monitoring Phase:** Grading
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Health Department
- **Action Indicating Compliance:** If remains are found, written approval by MLD or his/her authorized representative after inspection.

SC 3.3-4 Should any paleontological resources be uncovered during grading or excavation activities, the construction contractor shall divert activities to a part of the site away from the find, and a qualified paleontologist shall be contracted by the contractor to: (1) ascertain the significance of the resource; (2) establish protocol with the project applicant to protect such resources; (3) ascertain the presence of additional resources; and (4) provide additional monitoring of the site, if deemed appropriate. If human remains are discovered on the site, the Los Angeles County Coroner shall be contacted to examine the remains, and the provisions of Section 15064.5(3) of the CEQA Guidelines shall be followed.

- **Monitoring Phase:** Grading
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** If paleontological resources are discovered, preparation of protocol and preparation of a written report by paleontologist. Inclusion of requirement in contract specifications.

Hazards and Hazardous Wastes

Project Design Features

PDF 3.4-1 The proposed terminal improvements would be constructed in a manner consistent with LEED standards certification requirements to, among other things, minimize potential hazards and hazardous waste impacts.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach Public Works Department
- **Action Indicating Compliance:** Inclusion of requirement in contract specifications. Site inspections.

Mitigation Measures

MM 3.4-6 The City Engineer, or his designee, shall verify that every contractor transporting or handling hazardous materials and/or wastes during project implementation has permits and licenses from all relative health and regulatory agencies to operate and properly manifest all hazardous or California regulated material.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach Public Works Department
- **Monitoring Agency:** City of Long Beach Public Works Department
- **Action Indicating Compliance:** Proof that appropriate permits and licenses have been obtained; display of manifests.

MM 3.4-7 Prior to initiating construction activities, the contractor shall verify the locations of underground pipelines in the terminal area, ramp, and parking areas. Appropriate precautions shall be taken to ensure that pipelines are not disturbed or are properly relocated during construction.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Inclusion of requirement in contract specifications. Site inspections.

MM 3.4-8 Prior to issuance of grading permits, the applicant shall test the soil for aerially deposited lead and dichloro-diphenyl-trichloroethane (DDT). As a result of soil testing, should aerially deposited lead or DDT be found in quantities that exceed acceptable thresholds, the applicant shall develop a remediation program to dispose of soil material properly.

- **Monitoring Phase:** Grading
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Health Department
- **Action Indicating Compliance** Written description of findings of soil test/issuance of grading permits.

Noise

Standard Conditions and Requirements

SC 3.6-2 The contractor shall comply with the City of Long Beach Noise Ordinance pertaining to limitations on construction activities, as outlined in Exhibit 3.6-12 of the EIR, to the extent feasible while minimizing any potential conflicts with aviation activities.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Inclusion of requirement in contract specifications. Adherence to the construction hours and requirements specified in the City's Noise Ordinance or permission from City work outside of those hours.

Mitigation Measures

MM 3.6-1 The City shall conduct noise measurements during any night construction on Parcel O where such construction involves the use of heavy construction equipment such as front loaders, tractors, graders, paving machines, jackhammers or similar devices. Such measurements shall be made near the homes located directly across Clark Avenue from Parcel O. If any night measurement exceeds the limits specified in Sections 8.80.150 and 8.80.160 of the Long Beach Municipal Code as a result of the construction activity, the operation shall be terminated until such time that a construction noise mitigation plan can be put into effect that will result in compliance with the night time noise limits. Note that in the case where ambient noise levels exceed the noise limits specified in Section 8.80.160, the allowable noise exposure standard shall be increased per Section 8.80.150 [C] of the Municipal Code to reflect ambient levels.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department

- **Action Indicating Compliance:** Reports summarizing the findings of the noise measurements if heavy construction equipment as defined above is used on during night construction on Parcel O. Preparation of a construction noise mitigation plan (if applicable).

Traffic and Circulation

Standard Conditions and Requirements

SC 3.8-1 As part of contract specification, the Airport shall require all construction trucks to access the Airport terminal area via the I-605 to I-405 and Lakewood Boulevard. Should oversized-transport vehicles accessing the Project site use a State highway, a Caltrans transportation permit will be required. Construction vehicles accessing Parcel O shall use this route and access the construction site off of Clark Avenue or Willow Street.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Site inspections.

CONSTRUCTION STAGE

Aesthetics

Mitigation Measures

MM 3.1-1 During construction activities, the construction contractor shall ensure that construction materials and equipment staging areas be located away from existing residential uses and, when feasible, appropriate screening (i.e., temporary fencing with opaque material) shall be used to buffer views of the construction site.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Placement of staging area to be approved prior to building commencement. Inclusion of requirement in contract specifications.

MM 3.1-2 During construction activities, the construction contractor shall ensure that temporary construction-related security lighting shall be arranged so that direct rays will not shine on or produce glare for adjacent street traffic and residential uses. The light fixtures specified for the Project design must comply with the standard of the Illuminating Engineering Society for full cutoff capability.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Inclusion of requirement in contract specifications. Approval of construction staging plans.

Air Quality and Human Health Risk Assessment

Standard Conditions and Requirements

SC 3.2-1 During construction of the Proposed Project, the City and its contractors will be required to comply with regional rules, which would assist in reducing short-term air pollutant emissions. SCAQMD Rule 402 requires that air pollutant emissions should not create a nuisance off-site. SCAQMD Rule 403 requires that fugitive dust be controlled with the best available control measures so the presence of such dust does not remain visible in the atmosphere beyond the property line of the emission source. Two options are presented in Rule 403; monitoring of particulate concentrations or active control. Monitoring involves a sampling network around the project with no additional control measures unless specified concentrations are exceeded. The active control option does not require any monitoring, but requires that a list of measures be implemented starting with the first day of construction.

Rule 403 requires that "A person conducting active operations within the boundaries of the South Coast Air Basin shall utilize one or more of the

applicable best available control measures to minimize fugitive dust emissions from each fugitive dust source type which is part of the active operation." Rule 403 also requires that the construction activities "shall not cause or allow PM₁₀ levels to exceed 50 micrograms per cubic meter when determined by simultaneous sampling, as the difference between upwind and down wind sample." A project is exempt from the monitoring requirement "if the dust control actions, as specified in Table 2 are implemented on a routine basis for each applicable fugitive dust source type." (Table 2 from Rule 403 is presented at the end of this MMRP as Table 1.) Under high wind conditions (i.e., when wind gusts exceed 25 miles per hour) additional control measures are required, and "the required control measures for high wind conditions are implemented for each applicable fugitive dust source type, as specified in Table 1." (Table 1 from Rule 403 is presented at the end of this MMRP as Table 2.) Monitoring of particulate concentrations does not reduce fugitive dust emissions; therefore, to minimize fugitive dust emissions the construction activities will utilize the measures presented in Table 2 and Table 1 (Tables 1 and 2 in Rule 403) rather than the monitoring option of SCAQMD Rule 403.

Further, Rule 403 requires that the project shall "prevent or remove within one hour the track-out of bulk material onto public paved roadways as a result of their operations." Alternatively, the project can "take at least one of the actions listed in Table 3." (Table 3 from Rule 403 is presented at the end of this MMRP as Table 3.) In addition, the project would be required to "prevent the track-out of bulk material onto public paved roadways as a result of their operations and remove such material at anytime track-out extends for a cumulative distance of greater than 50 feet on to any paved public road during active operations; and remove all visible roadway dust tracked-out upon public paved roadways as a result of active operations at the conclusion of each work day when active operations cease.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** South Coast Air Quality Management District
- **Action Indicating Compliance:** Inclusion of requirement in contract specifications. Site inspections.

SC 3.2-2

In support of PDF 3.2-1, requiring the design and construction of the terminal improvements to meet LEED standards, building materials, architectural coatings and cleaning solvents shall comply with all applicable SCAQMD rules and regulations.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Inclusion of requirement in contract specifications. Field inspections.

Mitigation Measures

The follow mitigation measures are grouped because the enforcement agency, monitoring agency, and actions indicating compliance are the same for all.

- MM 3.2-1 The contract specifications shall require and the City shall enforce general contractors to ensure that all equipment is properly tuned and maintained in accordance with manufacturers' specifications.
- MM 3.2-2 The contract specifications shall require and the City shall enforce general contractors to maintain and operate construction equipment so as to minimize exhaust emissions. During construction, engines on trucks and vehicles in loading and unloading queues will be turned off when not in use, to reduce vehicle emissions. Construction activities should be phased and scheduled to avoid emissions peaks and discontinued during second-stage smog alerts.
- MM 3.2-3 The contract specifications shall require and the City shall enforce general contractors sweep streets as needed during construction, but not more frequently than hourly, if visible soil material has been carried onto adjacent public roads.
- MM 3.2-4 The contract specifications shall require and the City shall enforce general contractors to visually inspect construction equipment prior to leaving the site; loose dirt shall be washed off with wheel washers as necessary.
- MM 3.2-5 During construction, the City shall coordinate with the contractor to maximize the ability to power construction activity utilizing electricity from power poles rather than temporary diesel or gasoline power generators, to the extent possible.
- MM 3.2-6 The contract specifications shall require that all on-site mobile equipment used during construction shall be powered by alternative fuel sources (i.e., methanol, natural gas, propane, or butane) where feasible.
- MM 3.2-7 During construction, the City shall provide a location and require the contractor to store all construction equipment used in the project construction within the project site (away from adjacent residential areas) to reduce the impact on the roadway system and the resultant air emissions.
- On-site construction equipment staging areas and construction worker parking lots shall be located on either paved surfaces or unpaved surfaces that are periodically treated with non-toxic soil stabilizers.
- MM 3.2-8 The contract specifications shall require and the City shall enforce the contractor to schedule all deliveries related to construction activities that affect traffic flow during off-peak hours (e.g., 10:00 a.m. and 3:00 p.m.) and deliveries shall be coordinated to achieve consolidated truck trips. When traffic flow is impacted by the movement of construction materials and/or equipment, temporary traffic controls shall be provided to improve traffic flow (e.g., flag person).
- MM 3.2-9 The contract specifications shall require all on-site heavy-duty construction equipment shall be equipped with diesel particulate traps to the extent that this equipment is available at the time the contracts are awarded.
- MM 3.2-10 The construction specifications shall require and the City shall enforce that emulsified diesel fuel be used in diesel-fueled construction equipment that is not equipped with diesel particulate traps to reduce NO_x emissions.

The use of emulsified diesel fuel in construction equipment is assumed to reduce construction equipment NO_x emissions by 15 to 20 percent (CARB 2004). Applying the lower end of that range to the peak daily NO_x emissions from construction equipment would reduce NO_x emissions by approximately 70 lbs/day to a peak day NO_x emission inventory for construction of 424 lbs/day. This level would still be above the significance threshold. VOC emissions would also remain significant and unavoidable.

MM 3.2-10a During construction of the Proposed Project, the City and its contractors shall be required to comply with the following provisions, where feasible, to reduce construction NO_x and VOC emissions:

- Provide on-site lunch trucks/facilities during construction to reduce off-site worker vehicle trips.
- Prohibit construction vehicles idling in excess of five minutes to be consistent with State law.
- Suspend use of all construction equipment during a first-stage smog alert.
- Designate a person who will ensure implementation of the proposed mitigation measures through direct inspection and investigation of complaints. The City or the contractor shall provide a telephone number that residents may call should they have complaints regarding construction nuisance.

MM 3.2-10b During construction of the Proposed Project, the City and its contractors shall be required to comply with the following provisions, where feasible, to reduce construction VOC emissions:

- Use zero VOC content architectural coatings on buildings.
- Restrict the number of gallons of coatings used per day.
- Encourage water-based coatings or other low-emitting alternatives.
- Paint contractors should use hand applications instead of spray guns.

MM 3.2-17 The City will require street cleaning of Douglas Drive with a vacuum type street sweeper at least once per week. The vacuum sweeper will make sufficient circuits through the terminal area to vacuum the entire street surface (not just the gutter area) to reduce fugitive PM emissions from re-entrained road dust. Douglas Drive between Lakewood Boulevard and the Long Beach Airport terminal (including the loop in front of the terminal and return) shall be cleaned in this manner. The anticipated future exit road back to Lakewood Boulevard would also be cleaned in this manner.

The range of potential control efficiencies for this mitigation measure is from approximately 10 percent to 50 percent.^{5,6} It is anticipated that a 75 percent reduction would be needed to reduce the peak incremental PM10 concentration

⁵ Cowherd, C., P. Englehart, G.E. Muleski, J.S. Kinsey, and K.D. Rosbury, 1990. Control of Fugitive and Hazardous Dusts, Noyes Data Corporation, Park Ridge, NJ. p.21.

⁶ "Improvement of Specific Emission Factors (BACM Project No. 1) Final Report," by Midwest Research Institute for SCAQMD, Diamond Bar, CA, March 29, 1996.

below the significance threshold; therefore, PM10 concentrations would remain significant after implementation of this mitigation measure.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Inclusion of requirement in contract specifications. Site inspections.

Hazards and Hazardous Wastes

Project Design Features

PDF 3.4-1 The proposed terminal improvements would be constructed in a manner consistent with LEED standards certification requirements to, among other things, minimize potential hazards and hazardous waste impacts.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach Public Works Department
- **Action Indicating Compliance:** Inclusion of requirement in contract specifications. Site inspections.

Standard Conditions and Requirements

SC 3.4-5 Construction of the Proposed Project shall be in compliance with local and State construction and building requirements and regulations, including the Uniform Building Code.

- **Monitoring Phase:** Pre-Construction/Construction
- **Enforcement Agency:** City of Long Beach, Planning and Building Department
- **Monitoring Agency:** City of Long Beach, Planning and Building Department
- **Action Indicating Compliance:** Approval of Development Plans. Site inspections.

Mitigation Measures

MM 3.4-4 As part of the contract specification, a haul route, which could include Willow Street, shall be designated by the City Engineer, or his designee. During construction, the City Engineer, or his designee shall instruct every contractor that no hazardous or acutely hazardous materials may be transported onto the Airport via Willow Street to avoid potential impacts within one-quarter mile of the Alpert Jewish Community Center, where school programs are conducted.

- **Monitoring Phase:** Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Inclusion of requirement in contract specifications. A completed haul route/notes written during site visits including directives given to the contractor/crew regarding transportation of hazardous materials.

MM 3.4-6 The City Engineer, or his designee, shall verify that every contractor transporting or handling hazardous materials and/or wastes during project implementation has permits and licenses from all relative health and regulatory agencies to operate and properly manifest all hazardous or California regulated material.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach Public Works Department
- **Monitoring Agency:** City of Long Beach Public Works Department
- **Action Indicating Compliance:** Proof that appropriate permits and licenses have been obtained; display of manifests.

MM 3.4-7 Prior to initiating construction activities, the contractor shall verify the locations of underground pipelines in the terminal area, ramp, and parking areas. Appropriate precautions shall be taken to ensure that pipelines are not disturbed or are properly relocated during construction.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Inclusion of requirement in contract specifications. Site inspections.

Noise

Standard Conditions and Requirements

SC 3.6-2 The contractor shall comply with the City of Long Beach Noise Ordinance pertaining to limitations on construction activities, as outlined in Exhibit 3.6-12 of the EIR, to the extent feasible while minimizing any potential conflicts with aviation activities.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Health Department

- **Action Indicating Compliance:** Inclusion of requirement in contract specifications. Adherence to the construction hours and requirements specified in the City's Noise Ordinance or permission from City work outside of those hours.

Mitigation Measures

- MM 3.6-1 The City shall conduct noise measurements during any night construction on Parcel O where such construction involves the use of heavy construction equipment such as front loaders, tractors, graders, paving machines, jackhammers or similar devices. Such measurements shall be made near the homes located directly across Clark Avenue from Parcel O. If any night measurement exceeds the limits specified in Sections 8.80.150 and 8.80.160 of the Long Beach Municipal Code as a result of the construction activity, the operation shall be terminated until such time that a construction noise mitigation plan can be put into effect that will result in compliance with the night time noise limits. Note that in the case where ambient noise levels exceed the noise limits specified in Section 8.80.160, the allowable noise exposure standard shall be increased per Section 8.80.150 [C] of the Municipal Code to reflect ambient levels.
- **Monitoring Phase:** Demolition/Grading/Construction
 - **Enforcement Agency:** City of Long Beach, Public Works Department
 - **Monitoring Agency:** City of Long Beach, Health Department
 - **Action Indicating Compliance:** Reports summarizing the findings of the noise measurements conducted if heavy construction equipment as defined above is used on during night construction on Parcel O. Preparation of a construction noise mitigation plan (if applicable).

Public Services

- MM 3.7-1 During construction activities, the relocation or modification of TSA facilities shall be coordinated with TSA to ensure that there is no compromise to TSA functions that would adversely affect TSA's ability to perform its passenger and baggage securing screening activities.
- **Monitoring Phase:** Construction
 - **Enforcement Agency:** City of Long Beach, Public Works Department, Airport Bureau
 - **Monitoring Agency:** City of Long Beach, Public Works Department, Airport Bureau
 - **Action Indicating Compliance:** Coordination with TSA to ensure that its passenger and baggage screening activities are not compromised.
- MM 3.7-2 Prior to initiation of any modifications to the airfield side, the contractor shall provide a Construction Phasing Implementation Plan, meeting the approval of the Airport Manager. The Plan shall demonstrate how construction activities will be conducted and that all applicable FAA airfield safety requirements are being met. In addition, the contractor shall prepare a safety plan and participate in on-going weekly safety meetings during construction.

- **Monitoring Phase:** Pre-construction/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department, Airport Bureau
- **Monitoring Agency:** City of Long Beach, Public Works Department, Airport Bureau
- **Action Indicating Compliance:** Acceptance of an approved Construction Phasing Implementation Plan and an approved Safety Plan

Traffic and Circulation

Standard Conditions and Requirements

SC 3.8-1 As part of contract specification, the Airport shall require all construction trucks to access the Airport terminal area via the I-605 to I-405 and Lakewood Boulevard. Should oversized-transport vehicles accessing the Project site use a State highway, a Caltrans transportation permit will be required. Construction vehicles accessing Parcel O shall use this route and access the construction site off of Clark Avenue or Willow Street.

- **Monitoring Phase:** Demolition/Grading/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Site inspections.

Project Design Features

PDF 3.8-1 A component of the Proposed Project is the provision of a new parking structure that would accommodate 4,000 vehicles.

- **Monitoring Phase:** Pre-construction/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Planning and Building Department
- **Action Indicating Compliance:** Design and construction of a parking structure

PDF 3.8-2 The project would also include the extension of the south side of the Donald Douglas Drive loop to exit onto Lakewood Boulevard, with eastbound right turn only to southbound access on to Lakewood Boulevard.

- **Monitoring Phase:** Pre-construction/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department

- **Action Indicating Compliance:** Design and extension of Douglas Drive loop; eastbound right turn to southbound access onto Lakewood Boulevard.

PDF 3.8-3

With the construction of the parking structure existing surface parking would be displaced. To address potential parking demand during construction, Parcel O would be developed to serve parking demand not met by existing facilities.

- **Monitoring Phase:** Pre-construction/Construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Development of Parcel O to accommodate displaced vehicle parking during construction of the parking structure and Terminal improvements. Compliance can also be accomplished by leasing existing unused parking spaces from Boeing (requires a signed lease agreement).

POST-CONSTRUCTION STAGE

Air Quality and Human Health Risk Assessment

The Proposed Project is a construction activity and, as such, would not result in operational impacts. The following mitigation options are proposed to reduce operational emission impacts associated with the Optimized Flights scenario and project alternatives:

Mitigation Measures

MM 3.2-14 The City shall require the use of ultra-low sulfur diesel for diesel-fueled equipment that are not readily convertible to electrical power on all future lease and operational agreements for air carriers.

- **Monitoring Phase:** Post-construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Inclusion of requirement in lease and operational agreements.

MM 3.2-15 Through its lease language with them, the City of Long Beach shall require the airlines to comply with the South Coast GSE MOU signed by the airlines and CARB in December 2002, or replacement agreements and/or regulations. Through the implementation of MM 3.2-12 and MM 3.2-13 (see Design section above), the Airport will design the infrastructure necessary to assist airlines in complying with the GSE MOU. The GSE MOU includes provisions for retrofitting diesel GSE with particulate traps where feasible. Therefore, compliance with the GSE MOU would reduce PM₁₀ and PM_{2.5} impacts as well as NO_x and VOC emissions.

The mitigated criteria pollutant emission inventories associated with installing preconditioned air, 400 Hz power, and electric battery chargers would reduce APU carbon monoxide (CO) emissions by 61 and APU NO_x emissions by 57 percent in 2011 and 2020. GSE CO emissions would be reduced by 97 percent in 2011; and GSE NO_x emissions would be reduced by 55 percent in 2011 and 40 percent in 2020.

Comparing the mitigated Project criteria pollutant incremental inventories to the operational emission thresholds indicates that the mitigated inventories of all pollutants except NO_x would be below the significance thresholds in 2011 and 2020.

MM 3.2-17 The City will require street cleaning of Douglas Drive with a vacuum type street sweeper at least once per week. The vacuum sweeper will make sufficient circuits through the terminal area to vacuum the entire street surface (not just the gutter area) to reduce fugitive PM emissions from re-entrained road dust. Douglas Drive between Lakewood Boulevard and the Long Beach Airport terminal (including the loop in front of the terminal and return) shall be cleaned in this manner. The anticipated future exit road back to Lakewood Boulevard would also be cleaned in this manner.

The range of potential control efficiencies for this mitigation measure is from approximately 10 percent to 50 percent.^{7,8} It is anticipated that a 75 percent reduction would be needed to reduce the peak incremental PM₁₀ concentration below the significance threshold; therefore, PM₁₀ concentrations would remain significant after implementation of this mitigation measure.

- **Monitoring Phase:** Post-construction
- **Enforcement Agency:** City of Long Beach, Public Works Department, Airport Bureau
- **Monitoring Agency:** City of Long Beach, Public Works Department, Airport Bureau
- **Action Indicating Compliance:** Inclusion of requirement in lease agreements or replacement agreements/regulations.

Noise

Standard Conditions and Requirements

SC 3.6-1 The Airport Noise Compatibility Ordinance would apply to continued operations at the Airport. All future operations would need to be consistent with the provisions of the ordinance.

- **Monitoring Phase:** Post-construction
- **Enforcement Agency:** City of Long Beach, Public Works Department
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Compliance documented through regular monitoring reports prepared pursuant to the Airport Noise Compatibility Ordinance.

⁷ Cowherd, C., P. Englehart, G.E. Muleski, J.S. Kinsey, and K.D. Rosbury, 1990. Control of Fugitive and Hazardous Dusts, Noyes Data Corporation, Park Ridge, NJ. p.21.

⁸ "Improvement of Specific Emission Factors (BACM Project No. 1) Final Report," by Midwest Research Institute for SCAQMD, Diamond Bar, CA, March 29, 1996.

Air Quality and Human Health Risk Assessment

Mitigation Measures

MM 3.2-16 As the City purchases new vehicles or equipment serving the Airport, staff shall consider the purchase of low or zero-emission technology, such as the use of CNG or any other clean fuel technology available.

- **Monitoring Phase:** On-going
- **Enforcement Agency:** City of Long Beach, Public Works Department, Fleet Bureau
- **Monitoring Agency:** City of Long Beach, Public Works Department, Fleet Bureau
- **Action Indicating Compliance:** Purchase of vehicles and equipment that are equipped with low or zero-emissions technology.

MM 3.2-17 The City will require street cleaning of Douglas Drive with a vacuum type street sweeper at least once per week. The vacuum sweeper will make sufficient circuits through the terminal area to vacuum the entire street surface (not just the gutter area) to reduce fugitive PM emissions from re-entrained road dust. Douglas Drive between Lakewood Boulevard and the Long Beach Airport terminal (including the loop in front of the terminal and return) shall be cleaned in this manner. The anticipated future exit road back to Lakewood Boulevard would also be cleaned in this manner.

The range of potential control efficiencies for this mitigation measure is from approximately 10 percent to 50 percent.^{9,10} It is anticipated that a 75 percent reduction would be needed to reduce the peak incremental PM₁₀ concentration below the significance threshold; therefore, PM₁₀ concentrations would remain significant after implementation of this mitigation measure.

Hazards and Hazardous Wastes

Standard Conditions and Requirements

SC 3.4-1 The Proposed Project and any additional flights associated with optimize flight operations would be required to comply with the provisions of the *Long Beach Airport Certification Manual* and *Long Beach Airport Rules and Regulations* pertaining to the handling, use, and disposal of hazardous materials and hazardous wastes.

- **Monitoring Phase:** On-going
- **Enforcement Agency:** City of Long Beach, Public Works Department, Airport Bureau

⁹ Cowherd, C., P. Englehart, G.E. Muleski, J.S. Kinsey, and K.D. Rosbury, 1990. Control of Fugitive and Hazardous Dusts, Noyes Data Corporation, Park Ridge, NJ. p.21.

¹⁰ "Improvement of Specific Emission Factors (BACM Project No. 1) Final Report," by Midwest Research Institute for SCAQMD, Diamond Bar, CA, March 29, 1996.

- **Monitoring Agency:** City of Long Beach, Public Works Department, Airport Bureau
- **Action Indicating Compliance:** Site inspections during construction; ongoing compliance shall occur in accordance with the *Long Beach Airport Certification Manual* and *Long Beach Airport Rules and Regulations*

Noise

Mitigation Measures

MM 3.6-2 Within 24 months of certification of the EIR, the Airport Manager shall develop a land use compatibility program addressing existing and future aviation noise levels. The program shall be an ongoing voluntary program that will provide noise attenuation and be available to all residential units within the 65 Community Noise Equivalent Level (CNEL) contour and schools within the 60 CNEL contour based on the contours published for Long Beach Airport for the previous calendar year (Quarterly Report for 12 month Period Ending December 31). In exchange for sound insulation treatment, the owners of the property will provide the City of Long Beach an avigation easement over said property. The program shall identify (1) methods of providing noise attenuation; (2) funding sources for the improvements; (3) methods for establishing priorities for implementing the improvements; and (4) an installation agreement. The land use compatibility program will be administered by the City of Long Beach, Airport Bureau.

- **Monitoring Phase:** On-going
- **Enforcement Agency:** City of Long Beach, Public Works Department, Airport Bureau
- **Monitoring Agency:** City of Long Beach, Public Works Department, Airport Bureau
- **Action Indicating Compliance:** Development of a land use compatibility program.

MITIGATION MEASURES ASSOCIATED WITH THE OPTIMIZED FLIGHTS SCENARIO

The following mitigation measures are not associated with the proposed project. Rather, they apply to future conditions under the Optimized Flights Scenario which, as noted in the Final EIR, could occur with or without implementation of the proposed project.

Traffic and Circulation

Mitigation Measures

The two impacted intersections along Lakewood Boulevard at Spring and Willow Streets are currently built out to the maximum feasible configuration. Additional improvements would require extensive right of way purchases that would impact several local businesses. Discussions with City staff indicate that no further lane additions are feasible at these two intersections. However, as discussed in Section 3.8 of the EIR, the impacts to these intersections under the Existing Plus Optimized Flights scenario are not expected until at a substantial number of the additional flights and associated passengers are added. For the Spring Street at Lakewood Boulevard intersection, the intersection would reach Level of Service (LOS) E when approximately 375 additional AM peak hour trips or an increase of 3,500 Average Day-Peak Month (ADPM) passengers (45 percent of the total added) over 2005 conditions. At the Willow Street and Lakewood Boulevard intersection, the intersection currently operates at LOS E, and would exceed the 0.02 Volume to Capacity Ratio (V/C) impact threshold when approximately 675 additional AM peak hour trips or 6,340 additional ADPM passengers occur. Currently, the ADPM is 9,246 passengers. Therefore, impacts would be expected if the ADPM level reached 12,746 passengers.

Though the Spring Street/Lakewood Boulevard intersection would still operate at a deficient level of service in the 2020, this is not an impact of the Proposed Project or the Optimized Flights scenario. Elsewhere the improvements associated with the Douglas Park would accommodate the additional demand associated with the Optimized Flights scenario. The improvements for Douglas Park include various Adaptive Traffic Control System measures, which are expected to increase the saturation flow rate by 10 percent to 1,760 vehicles per hour. While these improvements are expected, they are not currently programmed in any capital improvement program; therefore, their implementation cannot be relied upon to mitigate the impacts of the Existing with Optimized Flights scenario. Though the Optimized Flights are not a component of the Proposed Project, it is recommended that the following mitigation measure be adopted should the air carriers make the necessary adjustments to qualify for additional flight.

MM 3.8-1 In conjunction with the allocation of additional flights in accordance with the Airport Noise Compatibility Ordinance (Optimized Flights) the City shall develop a traffic monitoring program when the ADPM passenger levels reach 12,700. The traffic monitoring program shall evaluate the LOS at the Spring Street and Lakewood Boulevard and the Willow Street and Lakewood Boulevard intersections. If deficient LOS is identified, the City of Long Beach shall develop and implement a mitigation program that includes transportation management control measures to enhance the efficiency of traffic movement. Post implementation monitoring shall be required to ensure that sufficient capacity enhancement have been provided to accommodate the traffic associated with the increased passenger levels. If no deficiency in LOS is identified, the traffic monitoring of the key intersections shall be conducted on an annual basis or until such time as the improvements provided for as part of the Douglas Park project are implemented.

- **Monitoring Phase:** Post-buildout

- **Enforcement Agency:** City of Long Beach, Public Works Department

- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Traffic monitoring program as passenger levels reach designated levels. Development of a mitigation program that includes transportation management control measures or traffic monitoring of key intersections annually or until such time as the improvements provided for as part of the Douglas Park project are implemented.

With the Optimized Flights scenario the parking structure for the Airport would be insufficient to accommodate the additional passenger levels. Though the Optimized Flights scenario is not a component of the Proposed Project, the following mitigation measure is proposed to address this potential impact.

MM 3.8-2 In conjunction with the allocation of additional flights in accordance with the Airport Noise Compatibility Ordinance (Optimized Flights) when the annual passenger levels reach 4.2 Million Annual Passengers (MAP) the Airport Manager shall identify and develop additional on-site parking opportunities. This may include development of an additional parking structure within the Airport Entrance area. Implementation of the identified improvements would require separate documentation pursuant to CEQA.

- **Monitoring Phase:** Post-buildout
- **Enforcement Agency:** City of Long Beach, Public Works Department, Airport Manager
- **Monitoring Agency:** City of Long Beach, Public Works Department
- **Action Indicating Compliance:** Development of parking facilities/opportunities to meet onsite needs when designated passenger levels are met.

APPLICABLE SCAQMD RULES

**TABLE 1
FUGITIVE DUST CONTROL ACTIONS FOR EXEMPTION TO MONITORING
(RULE 403 TABLE 2)**

Source Category	Control Actions
Earth-moving (except construction cutting and filling areas, and mining operations)	<p>(1a) Maintain soil moisture content at a minimum of 12%, as determined by ASTM method D-2216, or other equivalent method approved by the Executive Officer, the California Air Resources Board, and the United States Environmental Protection Agency (USEPA). Two soil moisture evaluations must be conducted during the first three hours of active operations during a calendar day, and two such evaluations each subsequent four-hour period of active operations; OR</p> <p>(1a-1) For any earth-moving which is more than 100 feet from all property lines, conduct watering as necessary to prevent visible dust emissions from exceeding 100 feet in length in any direction.</p>
Earth-moving: Construction fill areas	<p>(1b) Maintain soil moisture content at a minimum of 12%, as determined by ASTM method D-2216, or other equivalent method approved by the Executive Officer, the California Air Resources Board, and the USEPA. For areas which have an optimum moisture content for compaction of less than 12%, as determined by ASTM Method 1557 or other equivalent method approved by the Executive Officer and the California Air Resources Board and the USEPA, complete the compaction process as expeditiously as possible after achieving at least 70% of the optimum soil moisture content. Two soil moisture evaluations must be conducted during the first three hours of active operations during a calendar day, and two such evaluations during each subsequent four-hour period of active operations.</p>
Earth-moving: Construction cut areas and mining operations	<p>(1c) Conduct watering as necessary to prevent visible emissions from extending more than 100 feet beyond the active cut or mining area unless the area is inaccessible to watering vehicles due to slope conditions or other safety factors.</p>
Disturbed surface areas (except completed grading areas)	<p>(2a/b) Apply dust suppression in sufficient quantity and frequency to maintain a stabilized surface. Any areas which cannot be stabilized, as evidenced by wind driven fugitive dust must have an application of water at least twice per day to at least 80% of the unstabilized area.</p>
Disturbed surface areas: Completed grading areas	<p>(2c) Apply chemical stabilizers within five working days of grading completion; OR</p> <p>(2d) Take actions (3a) or (3c) specified for inactive disturbed surface areas</p>
Inactive disturbed surface areas	<p>(3a) Apply water to at least 80% of all inactive disturbed surface areas on a daily basis when there is evidence of wind driven fugitive dust, excluding any areas which are inaccessible to watering vehicles due to excessive slope or other safety conditions; OR</p> <p>(3b) Apply dust suppressants in sufficient quantity and frequency to maintain a stabilized surface; OR</p> <p>(3c) Establish a vegetative ground cover within 21 days after active operations have ceased. Ground cover must be of sufficient density to expose less than 30% of unstabilized ground within 90 days of planting, and at all times thereafter; OR</p> <p>(3d) Utilize any combination of control actions (3a), (3b), and (3c) such that, in total, these actions apply to all inactive disturbed surface areas.</p>
Unpaved Roads	<p>(4a) Water all roads used for any vehicular traffic at least once per every two hours of active operations; OR</p> <p>(4b) Water all roads used for any vehicular traffic once daily and restrict vehicle speeds to 15 miles per hour; OR (4c) Apply a chemical stabilizer to all unpaved road surfaces in sufficient quantity and frequency to maintain a stabilized surface.</p>
Open storage piles	<p>(5a) Apply chemical stabilizers; OR</p> <p>(5b) Apply water to at least 80% of the surface area of all open storage piles on a daily basis when there is evidence of wind driven fugitive dust; OR</p> <p>(5c) Install temporary coverings; OR</p> <p>(5d) Install a three-sided enclosure with walls with no more than 50% porosity which extends, at a minimum, to the top of the pile.</p>
All Categories	<p>(6a) Any other control measures approved by the Executive Officer and the USEPA as equivalent to the methods specified in Table 2 may be used.</p>

TABLE 2
REQUIRED BEST AVAILABLE CONTROL MEASURES
(SCAQMD RULE 403, TABLE 1)

Control Measure		Guidance
Backfilling		
01-1	Stabilize backfill material when not actively handling; and	<ul style="list-style-type: none">• Mix backfill soil with water prior to moving• Dedicate water truck or high capacity hose to backfilling equipment• Empty loader bucket slowly so that no dust plumes are generated• Minimize drop height from loader bucket
01-2	Stabilize backfill material during handling; and	
01-3	Stabilize soil at completion of activity.	
Clearing and Grubbing		
02-1	Maintain stability of soil through pre-watering of site prior to clearing and grubbing; and	<ul style="list-style-type: none">• Maintain live perennial vegetation where possible• Apply water in sufficient quantity to prevent generation of dust plumes
02-2	Stabilize soil during clearing and grubbing activities; and	
02-3	Stabilize soil immediately after clearing and grubbing activities.	
Clearing Forms		
03-1	Use water spray to clear forms; or	<ul style="list-style-type: none">• Use of high pressure air to clear forms may cause exceedance of Rule requirements
03-2	Use sweeping and water spray to clear forms; or	
03-3	Use vacuum system to clear forms.	
Crushing		
04-1	Stabilize surface soils prior to operation of support equipment; and	<ul style="list-style-type: none">• Follow permit conditions for crushing equipment• Pre-water material prior to loading into crusher• Monitor crusher emissions opacity• Apply water to crushed material to prevent dust plumes
04-2	Stabilize material after crushing.	
Cut and Fill		
05-1	Pre-water soils prior to cut and fill activities; and	<ul style="list-style-type: none">• For large sites, pre-water with sprinklers or water trucks and allow time for penetration• Use water trucks/pulls to water soils to depth of cut prior to subsequent cuts
05-2	Stabilize soil during and after cut and fill activities.	
Demolition – Mechanical/Manual		
06-1	Stabilize wind erodible surfaces to reduce dust; and	<ul style="list-style-type: none">• Apply water in sufficient quantities to prevent the generation of visible dust plumes
06-2	Stabilize surface soil where support equipment and vehicles will operate; and	
06-3	Stabilize loose soil and demolition debris; and	
06-4	Comply with AQMD Rule 1403.	
Disturbed Soil		
07-1	Stabilize disturbed soil throughout the construction site; and	<ul style="list-style-type: none">• Limit vehicular traffic and disturbances on soils where possible• If interior block walls are planned, install as early as possible• Apply water or a stabilizing agent in sufficient quantities to prevent the generation of visible dust plumes
07-02	Stabilize disturbed soil between structures	
Earth-Moving Activities		
08-1	Pre-apply water to depth of proposed cuts; and	<ul style="list-style-type: none">• Grade each project phase separately, timed to coincide with construction phase• Upwind fencing can prevent material movement on site• Apply water or a stabilizing agent in sufficient quantities to prevent the generation of visible dust plumes
08-2	Re-apply water as necessary to maintain soils in a damp condition and to ensure that visible emissions do not exceed 100 feet in any direction; and	
08-3	Stabilize soils once earth-moving activities are complete.	

TABLE 2
REQUIRED BEST AVAILABLE CONTROL MEASURES
(SCAQMD RULE 403, TABLE 1)
(Continued)

Control Measure	Guidance
Importing/Exporting of Bulk Materials	
09-1 Stabilize material while loading to reduce fugitive dust emissions; and	<ul style="list-style-type: none">• Use tarps or other suitable enclosures on haul trucks• Check belly-dump truck seals regularly and remove any trapped rocks to prevent spillage• Comply with track-out prevention/mitigation requirements• Provide water while loading and unloading to reduce visible dust plumes
09-2 Maintain at least six inches of freeboard on haul vehicles; and	
09-3 Stabilize material while transporting to reduce fugitive dust emissions; and	
09-4 Stabilize material while unloading to reduce fugitive dust emissions; and	
09-5 Comply with Vehicle Code Section 23114.	
Landscaping	
10-1 Stabilize soils, materials, slopes	<ul style="list-style-type: none">• Apply water to materials to stabilize, maintain materials in a crusted condition• Maintain effective cover over materials• Stabilize sloping surfaces using soil binders until vegetation or ground cover can effectively stabilize the slopes• Hydroseed prior to rain season
Road Shoulder Maintenance	
11-1 Apply water to unpaved shoulders prior to clearing; and	<ul style="list-style-type: none">• Installation of curbing and/or paving of road shoulders can reduce recurring maintenance costs• Use of chemical dust suppressants can inhibit vegetation growth and reduce future road shoulder maintenance costs
11-2 Apply chemical dust suppressants and/or washed gravel to maintain a stabilized surface after completing road shoulder maintenance.	
Screening	
12-1 Pre-water material prior to screening; and	<ul style="list-style-type: none">• Dedicate water truck or high capacity hose to screening operation• Drop material through the screen slowly and minimize drop height• Install wind barrier with a porosity of no more than 50% upwind of screen to the height of the drop point
12-2 Limit fugitive dust emissions to opacity and plume length standards; and	
12-3 Stabilize material immediately after screening.	
Staging Areas	
13-1 Stabilize staging areas during use; and	<ul style="list-style-type: none">• Limit size of staging area• Limit vehicle speeds to 15 miles per hour• Limit number and size of staging area entrances/exits
13-2 Stabilize staging area soils at project completion.	
Stockpiles/Bulk Material Handling	
14-1 Stabilize stockpiled materials.	<ul style="list-style-type: none">• Add or remove material from the downwind portion of the storage pile• Maintain storage piles to avoid steep sides or faces
14-2 Stockpiles within 100 yards of off-site occupied buildings must not be greater than eight feet in height; or must have a road bladed to the top to allow water truck access or must have an operational water irrigation system that is capable of complete stockpile coverage.	
Traffic Areas for Construction Activities	
15-1 Stabilize all off-road traffic and parking areas; and	<ul style="list-style-type: none">• Apply gravel/paving to all haul routes as soon as possible to all future roadway areas• Barriers can be used to ensure vehicles are only used on established parking areas/haul routes
15-2 Stabilize all haul routes; and	
15-3 Direct construction traffic over established haul routes.	

TABLE 2
REQUIRED BEST AVAILABLE CONTROL MEASURES
(SCAQMD RULE 403, TABLE 1)
(Continued)

Control Measure		Guidance
Trenching		
16-1	Stabilize surface soils where trencher or excavator and support equipment will operate; and	<ul style="list-style-type: none">• Pre-watering of soils prior to trenching is an effective preventive measure.• For deep trenching activities, pre-trench to 18 inches, soak soils via the pre-trench and resume trenching• Washing mud and soils from equipment at the conclusion of trenching activities to prevent crusting and drying of soil on equipment
16.2	Stabilize soils at the completion of trenching activities.	
Truck Loading		
17-1	Pre-water material prior to loading; and	<ul style="list-style-type: none">• Empty loader bucket such that no visible dust plumes are created• Ensure that the loader bucket is close to the truck to minimize drop height while loading
17.2	Ensure that freeboard exceeds six inches (CVC 23114)	
Turf Overseeding		
18-1	Apply sufficient water immediately prior to conducting turf vacuuming activities to meet opacity and plume length standards; and	<ul style="list-style-type: none">• Haul waste material immediately off-site
18-2	Cover haul vehicles prior to exiting the site.	
Unpaved Roads/Parking Lots		
19-1	Stabilize soils to meet the applicable performance standards; and	<ul style="list-style-type: none">• Restricting vehicular access to established unpaved travel paths and parking lots can reduce stabilization requirements
19-2	Limit vehicular travel to established unpaved roads (haul routes) and unpaved parking lots.	
Vacant Land		
20-1	In instances where vacant lots are 0.10 acre or larger and have a cumulative area of 500 square feet or more that are driven over and/or used by motor vehicles and/or off-road vehicles, prevent motor vehicle and/or off-road vehicle trespassing, parking and/or access by installing barriers, curbs, fences, gates, posts, signs, shrubs, trees or other effective control measures.	

TABLE 3
TRACK OUT CONTROL OPTIONS

(1)	Pave or apply chemical stabilization at sufficient concentration and frequency to maintain a stabilized surface starting from the point of intersection with the public paved surface, and extending for a centerline distance of at least 100 feet and a width of at least 20 feet.
(2)	Pave from the point of intersection with the public paved road surface, and extending for a centerline distance of at least 25 feet and a width of at least 20 feet, and install a track-out control device immediately adjacent to the paved surface such that exiting vehicles do not travel on any unpaved road surface after passing through the track-out control device.
(3)	Any other control measures approved by the Executive Officer and the USEPA as equivalent to the methods specified in Table 3 may be used.